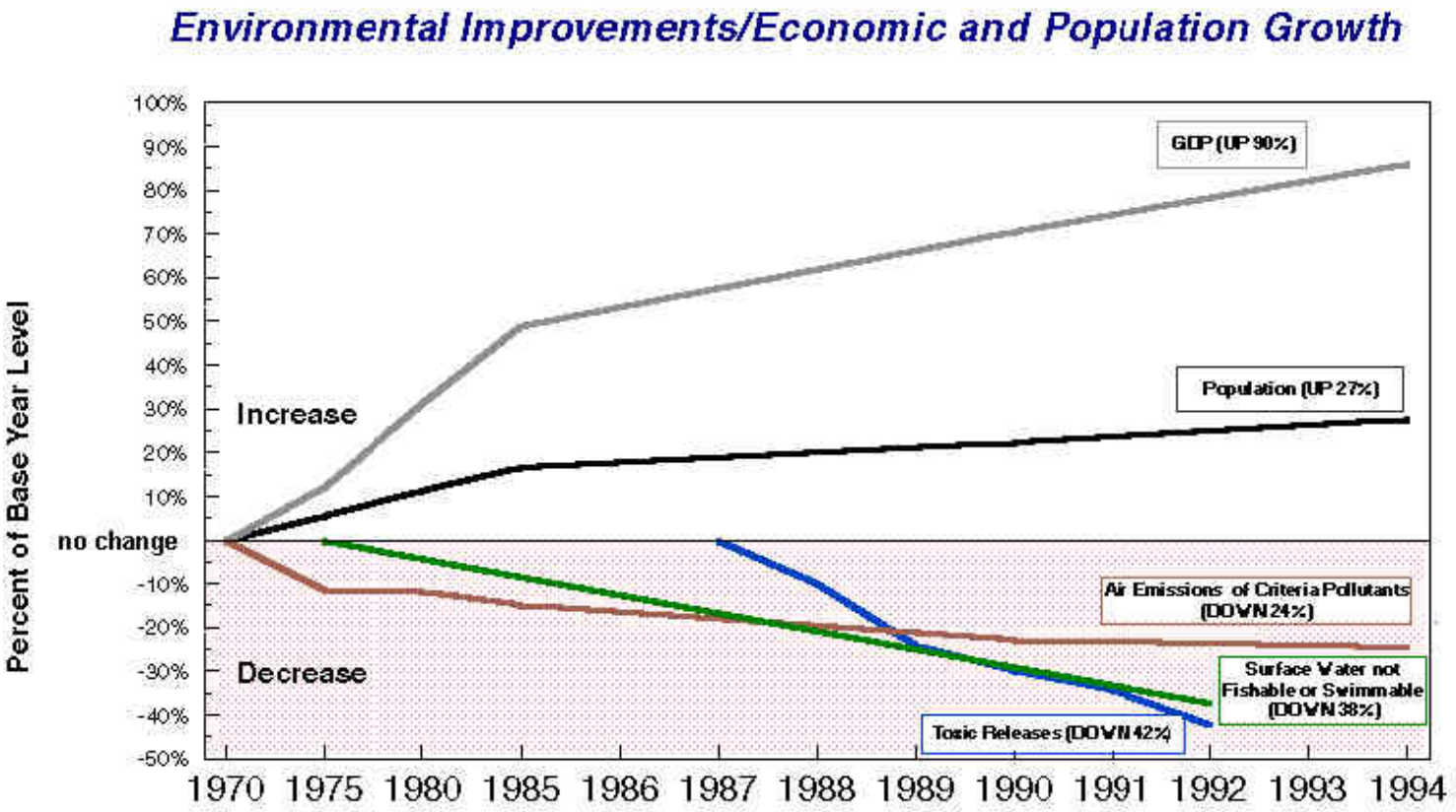
INTRODUCTION

TWENTY-FIVE YEARS OF ENVIRONMENTAL PROGRESS AT A GLANCE

This report celebrates EPA's twenty-fifth anniversary by chronicling the nation's progress in protecting public health and the quality of the natural environment. The data presented in the report show that citizens across the nation are breathing cleaner air, are drinking cleaner water, and have less exposure to dangerous toxic compounds than they did 25 years ago. The report explores these achievements using environmental trends and community profiles from around the country, and then underscores many of the challenges that continue to face the country.

The following graph shows how key environmental trends have improved over the past 25 years along with considerable growth in the U.S. Population and Gross Domestic Product (GDP). Many key facts, trends and challenges are summarized below as an introduction to the remainder of the report.



[Air Quality Improvements and Other Signs of Progress]

- Since 1990, the number of metropolitan areas not meeting air quality standards has dropped by more than half, from 199 cities to fewer than 70. Just since 1990, an additional 50 million Americans now live in areas where smog no longer exceeds health-based standards.

- Between 1985 and 1994, combined 90 of the nation's largest cities (excluding Los Angeles) saw a 72 percent reduction in the number of days where the air was considered unhealthy due to problems with ozone and carbon monoxide. During the same period, the 10 million citizens living and working in Los Angeles experienced one-third fewer days of unhealthy air.

- Since 1970, total emissions of six common air pollutants have decreased by an average of 24 percent.

- Since 1970, emissions of particulate matter decreased by 78 percent.

- Since 1988, airborne concentrations of fine particulate matter have dropped 20 percent.

- Since 1970, emissions of lead have declined by 98 percent, primarily by eliminating lead from gasoline and placing controls on specific industrial sources of lead.

- Since 1978, average blood-lead levels in children have declined by nearly 75 percent.

- Between 1987 and 1993, U.S. production of ozone-depleting chlorofluorocarbons fell by more than 60 percent.

- Annual sulfur dioxide emissions from electric power plants will be reduced to half of 1980 levels under the EPA's flexible, market-based program. This innovative approach will achieve these reductions while saving electric utilities and their customers approximately $3 billion per year over more traditional command-and-control regulations.

- The percentage of U.S. households that have tested their homes for radon has increased from 3.6 percent in 1990 to 10.2 percent in 1994.

- These improvements have been realized even as the economy grew by 90 percent, the population rose by 27 percent, and the number of motor vehicle miles driven increased by 111 percent.

Air Quality Challenges

- Sixty-two million Americans live in approximately 60 to 70 metropolitan areas that fail to meet air quality standards for one or more pollutants.

- Total emissions of nitrogen oxides (NOx), primarily due to automobile activity and coal-fired power plants, have increased by 14 percent since 1970. NOx contributes to ground-level ozone (smog) and other environmental problems.

- Indoor air pollutants such as lead, environmental tobacco smoke and radon pose significant human health risks.

- Continuing global challenges include the threats posed by chemicals that deplete the earth's protective ozone layer or impact global climate. Since 1972, for example, world-wide levels of carbon dioxide, a common "greenhouse gas," have increased by eight percent, contributing to potentially increases in global temperatures.

Water Quality Improvements & Other Signs of Progress

- About 60 percent of the Nation's surveyed rivers, lakes, and estuaries are clean enough to meet basic uses such as fishing and swimming.

- The volume of oil spilled in U.S. waters has declined significantly, from 15 million gallons per year in the mid 1970s to 2 million gallons in 1992, a decrease of 86 percent.

- Ocean dumping of sewage sludge, industrial waste, plastic debris, and medical waste has been banned.
- More than 1 billion pounds of toxic pollution have been prevented from entering our nation's waters each year due to wastewater standards put in place over the last twenty-five years.
- Wastewater standards have been developed for over 50 different industries and more than 57,000 industrial facilities now operate under a pollution control permit.
- More than 30,000 major industrial dischargers are covered by standards that require pretreatment of waste before it enters local sewers. This program has reduced toxic discharges entering public sewers (e.g., heavy metals or PCBs) by an estimated 75 percent.
- Seventy-three million more people, in thousands of communities across the nation, have upgraded sewage treatment, compared to 25 years ago. This added treatment has reduced discharges of harmful oxygen consuming wastes to our waters by 36 percent (from 6,700 metric tons a day in 1970 to 4,300 metric tons a day in 1992).
- Between 200,000 and 470,000 cases of gastrointestinal illnesses each year have been prevented by adherence to drinking water safety standards.
- About 4,000 communities have adopted special programs to protect ground water supplies from contamination.

Water Quality Challenges

- About 40 percent of the Nation's surveyed rivers, lakes, and estuaries are not clean enough to meet basic uses such as fishing and swimming.
- Although wetlands destruction is declining, the United States continues to lose nearly 70,000-90,000 acres of wetlands each year.
- Nonpoint source pollution such as pesticide runoff is now the leading cause of water pollution in our nation.
- Localized cases of waterborne diseases continue to threaten drinking water safety. In 1993, the parasite, cryptosporidium, was linked to over 400,000 illnesses and 100 deaths in Milwaukee.

Waste, Toxics, and Pesticides Management

- Overall, the volume of Toxic Release Inventory chemicals released into the environment was reduced by 43 percent between 1988 and 1993. Between 1988 and 1994, releases of 17 specific high priority toxic chemicals fell by more than 46 percent. Reductions in toxic releases to different areas of the environment can be summarized as follows:
    - Toxic air emissions fell by 39 percent;
    - Toxics discharged to surface waters decreased by 13 percent;
    - Disposal of toxic substances into deep wells fell by 57 percent while landfilling and other releases to land decreased by 44 percent.
- Since the early 1970s, EPA has worked to reduce the harmful effects of pesticides by:
    - Banning or eliminating the use of over 230 pesticides and 20,000 pesticide products, such as DDT.
    - Promoting programs that reduce the amount of pesticides applied to crops.

- Increasing the safety of those pesticides that are applied.
- Bringing safer pesticides to market.
- Establishing basic workplace protections for almost four million agricultural workers.

- Through recycling and composting, domestic waste recovery for other uses has increased from 7 percent by weight in 1970 to 24 percent in 1994.
- More than 141,000 clean-ups of underground storage tanks have been completed since 1990.
- Of the 1,300 Superfund sites considered to pose the highest risk to human health, EPA has implemented clean-up activities at 95 percent and completed clean up construction at 349 of these sites.

Waste, Toxics, and Pesticides Challenges

- From 1970 to 1994, U.S. solid waste production increased by one-third, from 123 million tons annually, or 3.3 pounds per person per day, to 209 million tons or 4.4 pounds per person per day.

New Directions

To meet the nation's future environmental challenges, the EPA is reinventing the way it provides environmental protection and exploring new directions to implement its programs fairer, faster and more cost-effectively. Reinvention at EPA means focusing on results and providing flexibility and incentives to encourage innovative solutions. It means forming partnerships with states and tribes as co-regulators, with stakeholders to support local efforts to forge sustainable futures, and with regulated entities to find leaner, cheaper solutions. It means empowering the public to take action by increasing access to information about pollutants in their communities and making more data available through programs such as the Toxics Release Inventory (TRI) program. It means finding ways to break down the legal barriers that currently make it difficult to implement integrated approaches for managing environmental quality at the facility-, industry-, and community-wide levels. Building on past successes, EPA is adopting a more comprehensive approach that develops integrated solutions for entire communities and ecosystems.


Return to Table of Contents